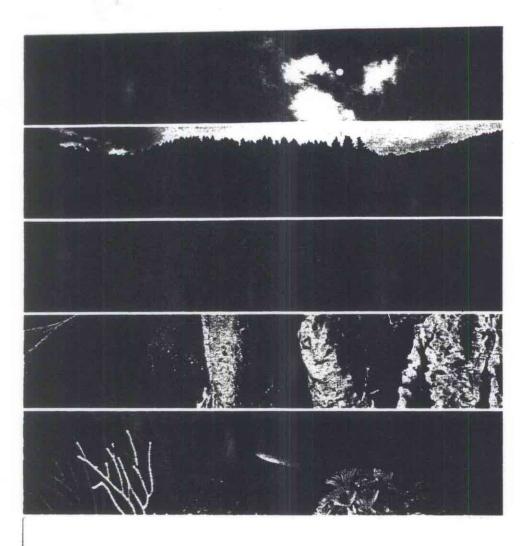
Species	Date(s) Observed	Spawning	Rearing DI	Magration
Arctic Char	8-24-84	×		×
Arctic charfry	July thre Mid Agest		×	
0				
	¥ (4)			

location of fish survey data, etc.

SEE H	CHLIGHTED PORTIONS OF THE DAMES +
MUONE R	SCONT ATTACHED (DAMES + MOGRE, 1984)
species, spe	of a map showing location of mouth and upper points of each ific stream reaches identified for spawning or rearing, locations of h as falls. Attach a copy of the fish survey data, if available.
Name of Obse	ver (please print)
Date:	Signature:
(~	Address:



JOB REPORT

1984 FISH SURVEY ALONG THE PROPOSED COMINCO ALASKA INC. ACCESS ROUTE

October 12, 1984

Dames & Moore

REGEIVED
JUL 1 0 1985

Alaska Dept. of Fish & Game Habitat — Region III made on the main Omikviorok River and on Dud Creek (Dames & Moore, unpublished data).

This report compiles and includes information from those earlier surveys along with results from the 1984 surveys.

2.0 MATERIALS AND METHODS

The primary method used for sampling fish in 1984 was a Smith-Root Type VII electroshocker fished in the pulsed DC mode. In 1982 and 1983 work, a Type XI electroshocker was used. In all 3 years, aerial stream surveys for spawning fish were conducted from helicopters. All streams with reasonable potential for spawning by anadromous fish were flown for several miles both up and downstream during late August or early September of at least one of the study years.

At all crossings surveyed, the nature of the stream habitat was qualitatively described and the stream then electroshocked for up to 100 meters up and downstream. Lesser distances were sampled in streams with moderate to high densities of fish. Fork length was measured on all salmonids captured and total length was recorded for cottids.

3.0 RESULTS AND DISCUSSION

3.1 GENERAL

A total of 17 potential stream crossings was surveyed between August 21 and 24, 1984. Of these, 14 were found to contain fish in the immediate vicinity of the crossing. In addition, the Lake Fork of the Omikviorok and the upper North Fork of Evaingiknuk Creek had fish downstream of the crossing, although none was taken at the crossing. Arctic char (Salvelinus alpinus) was the predominant species taken, followed by the sculpin (Cottus cognatus). Surprisingly, no juvenile Arctic grayling (Thymallus arcticus)

(39-56 mm) as well as larger grayling and cottids were also taken in 1982 in a reach just above the Right Tak confluence. No aufeis was evident in the reach upstream from the Right Tak confluence past the area of the present road crossing in a March, 1982 reconnaissance.

Crossing No. 11 Main Stem - Tutak Creek

At the crossing (center, Sec. 32, T29N, R20W), the mainstem of Tutak Creek has moderate sinuosity flowing in a relatively broad active flood plain flanked on the north at some distance by a low bluff. The river has a cobble/boulder bed with some areas of coarse gravel. Banks are alternately broad gravel bars and cutbanks with dense willow growth. Measured flow in mid-August, 1982 was 39 cfs and gradient is low to moderate.

The mainstem has good riffles, runs, and pools that provide excellent habitat for a variety of sizes of fish. Grayling adults are present in the slower runs and pools during most of the summer. From July through mid-August, grayling and char fry are abundant in shallow, slow-moving areas with coarse cobble bottom. In late August, 1984, no grayling fry were taken, but char fry were common both in shallow cobble areas and deeper (>30 cm) water along the cutbank side.

On August 24, 1984, there were about 100 mature char in pools in the reach from the road crossing upstream to the major fork just northeast of the end of a long ridge that isolates the upper main Tutak Valley. The southern fork flowing very close to the base of this ridge had no spawners. The northern fork had an additional 130 spawning fish in the 3 miles up to the next major fork. From the road crossing downstream to the Right Tak confluence, there were 35 adult char. However, it was unclear if these fish, and those just upstream of the crossing, were spawning or merely moving through to the main spawning area upstream. In any case, Tutak Creek is clearly an important spawning and rearing stream for anadromous char.

